

Optimize Your Home WiFi

Test your connection

We recommend you test your Internet service to make sure you are ready to work. We recommend using the free [speedtest.net](https://www.speedtest.net) website or iOS/Android app. This provides an end-to-end test of all the factors affecting your device's connection: your Internet provider, your home network setup, and the device you're on.

When you run Speedtest, there is an option to choose a server to test against — we recommend picking www.worwic.edu, which will approximate a connection to Wor-Wic Community College. For best results, you'll want at a minimum:

- 15 megabit per second (Mb/s) or better download speed
- 5 megabit per second (Mb/s) or better upload speed
- A 'ping time' of less than 75 milliseconds

Check with your provider

One of the first places to turn if you're having performance issues with an existing internet service is to contact your provider. Ask if you are getting the best service available in your area. If you have a router that you lease from your provider ask if they have an updated version, perform a firmware upgrade, or consider purchasing your own router.

Adjust your connection

Next to the Internet provider you use, the next most important factor is how you connect to the network within a house or other location.

If possible, directly connecting to the Internet router or access point via a wired (Ethernet) cable will provide the best quality, especially for audio/video applications like Zoom. If you connect via Ethernet, you don't need to worry about WiFi quality.

If you need to use WiFi, the quality of your wireless connection will significantly impact your overall Internet quality.

- Avoid having two or more walls or one floor between your computer and your home's Internet router/access point.
- Houses larger than 1,500 square feet or so (depending on layout and building materials) will usually need multiple wireless access points for good house-wide coverage.
- Upgrade your WiFi router firmware. Check your WiFi router vendor support site for firmware upgrade availability.
- If you're using the wireless access point that came with your internet connection, note that these often have average to poor coverage.

- Consider installing a newer WiFi access point, or WiFi mesh networks that cover your home with multiple access points. [The Wirecutter](#) by The New York Times regularly tests and recommends WiFi access points and mesh hardware.
- Wi-fi signals are transmitted at two different frequency modes: 2.4 GHz and 5 GHz. 2.4 GHz is an older technology and runs at slower speeds. However, 5 GHz is more susceptible to interference from walls/obstructions and has a shorter distance. You may try switching frequency modes to see if that improves performance.
- Be aware that certain things around your home, such as a microwave oven, can interfere with your WiFi connection. If this is the case in your home, you could move closer to the wireless router or even use an ethernet cable.
- Remember that streaming music and videos such as Netflix or Amazon Prime use Internet bandwidth; it may be a good time to dust off CD's or DVD's, or even a book.
- If you have a weak or spotty connection, try reducing the bandwidth requirements by turning off your video camera, or calling into the audio part of the meeting via a phone